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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
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| 09/403,560 | 01/12/2000 | TAKUYA NISHIMURA | MAT-V07839 | 7444 |

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LAWRENCE E ASHERY
RATNER & PRESTIA
ONE WESTLAKES BERWYN
SUITE 301 PO BOX 980
VALLEY FORGE, PA 194820980

| EXAMINER | |
|---|---|
| SMITHERS, MATTHEW | |
| **ART UNIT** | **PAPER NUMBER** |
| 2137 | 7 |

DATE MAILED: 03/19/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

| Office Action Summary | Application No. | Applicant(s) | |
|---|---|---|---|
| | 09/403,560 | NISHIMURA ET AL. | |
| | Examiner | Art Unit | |
| | Matthew B Smithers | 2137 | |

*-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --*

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

1)☒ Responsive to communication(s) filed on *12 January 2000*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

4)☒ Claim(s) *1-11 and 16-20* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-11 and 16-20* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

**Application Papers**

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☒ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date 5.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

## DETAILED ACTION

### *Priority*

Applicant cannot rely upon the foreign priority papers to overcome this rejection because a translation of said papers has not been made of record in accordance with 37 CFR 1.55. See MPEP § 201.15.

### *Information Disclosure Statement*

The information disclosure statement filed January 12, 2000 has been placed in the application file and the information referred to therein has been considered as to the merits.

### *Claim Objections*

Claims 6, 7, 8, 9, 11 and 18 are objected to because of the following informalities: The claims need to use the alternative language instead of the non-alternative language. More specifically, the use of "and" creates an improper multiple dependency for the respective claims listed above. Appropriate correction is required.

### *Claim Rejections - 35 USC § 102*

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

> (e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

The changes made to 35 U.S.C. 102(e) by the American Inventors Protection Act of 1999 (AIPA) and the Intellectual Property and High Technology Technical Amendments Act of 2002 do not apply when the reference is a U.S. patent resulting directly or indirectly from an international application filed before November 29, 2000. Therefore, the prior art date of the reference is determined under 35 U.S.C. 102(e) prior to the amendment by the AIPA (pre-AIPA 35 U.S.C. 102(e)).

Claims 1-11 and 16-20 are rejected under 35 U.S.C. 102(e) as being anticipated by U.S. patent 6,539,094 granted to Osakabe et al.

Regarding claim 1, Osakabe meets the claimed limitations as follows:

"A method for transferring data on a bus system using both isochronous communication and asynchronous communication; said isochronous communication is for any device on the bus to receive synchronous data; said asynchronous communication is for a predetermined device to receive asynchronous data; said synchronous data capable of containing actual data and encryption identification information indicating encrypted actual data; and encrypted actual data is decrypted using decrypting information obtained through the following steps:

a) receiving said synchronous data at a receiving device, and said receiving device via said asynchronous communication requesting decrypting information for said actual data from a sending device sending said synchronous data, if said encryption

identification indicates encrypted actual data;" see abstract; column 1, lines 21-32; column 3, lines 1-11 and column 6, lines 18-60;

b) receiving said request at said sending device and said sending device sending one of:

i) encrypted decrypting information of said actual data; and

ii) decrypting information data for obtaining said decrypting information, to said receiving device via said asynchronous communication; " see column 1, lines 46-62; column 5, lines 25-35 and column 6, lines 13-17

and

c) executing at said receiving device one of:

i) extracting said decrypting information from said encrypted decrypting information; and

ii) obtaining said decrypting information using said decrypting information data." see column 3, lines 38-52; column 5, lines 25-35 and column 6, lines 13-17.

Regarding claim 2, Osakabe meets the claimed limitations as follows: "The method for transferring data as defined in Claim 1, wherein a plurality of procedures are available between the steps of detecting encrypted actual data and obtaining said decrypting information by said receiving device receiving said synchronous data; and said receiving device executes the following steps for obtaining said decrypting information before requesting said decrypting information:

i) querying said sending device of types of procedures executable by said sending device before requesting said decrypting information;

ii) selecting a procedure from those executable by both said sending device and receiving device; and

iii) obtaining said decrypting information in accordance with said selected procedure." see abstract; column 5, line 17 to column 6, line 60.

Regarding claim 3, Osakabe meets the claimed limitations as follows:

"The method for transferring data as defined in Claim 2, wherein a procedure is selected in accordance with a predetermined priority when there are a plurality of procedures executable by both of said sending device and said receiving device." see abstract; column 5, line 17 to column 6, line 60.

Regarding claim 4, Osakabe meets the claimed limitations as follows:
"The method for transferring data as defined in Claim 1, wherein a plurality of procedures are available between the steps of detecting encrypted actual data and obtaining said decrypting information by said receiving device receiving said synchronous data; and said receiving device executes the following steps for obtaining said decrypting information:

i) starting a procedure selected from said plurality of procedures in accordance with a predetermined priority;

ii) re-selecting said procedures one-by-one until a procedure executable by said sending device is found; and

iii) obtaining said decrypting information in accordance with the selected procedure executable by said sending device." see abstract; column 5, line 17 to column 6, line 60.

Regarding claim 5, Osakabe meets the claimed limitations as follows: "The method for transferring data as defined in claim 2, wherein said asynchronous data transmitted between said sending device and said receiving device in accordance with said selected procedure contains an identifier for indicating the type of said procedure executed." see abstract; column 5, line 17 to column 6, line 60.

Regarding claim 6, Osakabe meets the claimed limitations as follows: "The method for transferring data as defined in one of Claims 1 to 5, 16 and 17, wherein said receiving device authenticates whether said sending device is an authorized sending device before making a request for said decrypting information." see abstract; column 5, line 17 to column 6, line 60.

Regarding claim 7, Osakabe meets the claimed limitations as follows: "The method for transferring data as defined in one of Claims 1 to 5, 16 and 17, wherein said sending device receiving a request for said decrypting information authenticates that said receiving device is an authorized receiving device before sending encrypted decrypting information of said actual data." see abstract; column 5, line 17 to column 6, line 60.

Regarding claim 8, Osakabe meets the claimed limitations as follows: "The method for transferring data as defined in one of Claims I to 5, 16 and 17, wherein said sending device and said receiving device are authenticated as authorized devices

before said receiving device makes a request for said decrypting information." see abstract; column 5, line 17 to column 6, line 60.

Regarding claim 9, Osakabe meets the claimed limitations as follows: "The method for transferring data as defined in one of Claims 1 to 5, 16 and 17, wherein the following steps are executed before said receiving device makes a request for said decrypting information:

i) said receiving device sending information required by said sending device at least for establishing a common key with said sending device; and

ii) said sending device sending information required by said receiving device at least for establishing said common key with said receiving device;

and said sending device encrypting said decrypting information using said common key and sending said encrypted decrypting information; and said receiving device extracting said decrypting information from said encrypted decrypting information received using said encryption key." see abstract; column 5, line 17 to column 6, line 60.

Regarding claim 10, Osakabe meets the claimed limitations as follows: "The method of transferring data as defined in one of claims 1 to 5, wherein only said actual data is encrypted." see abstract; column 5, line 17 to column 6, line 60.

Regarding claim 11, Osakabe meets the claimed limitations as follows: "The method for transferring data as defined in one of Claims 1 to 5, 16 and 17, wherein said sending device includes a signal source for said actual data and determines encryption of said actual data in a fixed length unit which is output from said signal source; and said sending device places encrypted actual data and non-encrypted actual

data in different output units of said synchronous communication, and then outputs them to said bus system." see abstract; column 5, line 17 to column 6, line 60.

Regarding claim 16, Osakabe meets the claimed limitations as follows: "The method for transferring data as defined in Claim 3, wherein said asynchronous data transmitted between said sending device and said receiving device in accordance with said selected procedure contains an identifier for indicating the type of said procedure executed." see abstract; column 5, line 17 to column 6, line 60.

Regarding claim 17, Osakabe meets the claimed limitations as follows: "The method for transferring data as defined in Claim 4, wherein said asynchronous data transmitted between said sending device and said receiving device in accordance with said selected procedure contains an identifier for indicating the type of said procedure executed." see abstract; column 5, line 17 to column 6, line 60.

Regarding claim 18, Osakabe meets the claimed limitations as follows: "The method for transferring data as defined in claims 1 to 5, 16 and 17, wherein said receiving device authenticates whether said sending device is an authorized sending device before making a request for said decrypting information." see abstract; column 5, line 17 to column 6, line 60.

Regarding claim 19, Osakabe meets the claimed limitations as follows: "The method for transferring data as defined in Claim 10, wherein the following steps are executed before said receiving device makes a request for said decrypting information:

i) said receiving device sending information required by said sending device at least for establishing a common key with said sending device; and

ii) said sending device sending information required by said receiving device at least for establishing said common key with said receiving device; and said sending device encrypting said decrypting information using said common key and sending said encrypted decrypting information; and said receiving device extracting said decrypting information from said encrypted decrypting information received using said common encryption key." see abstract; column 5, line 17 to column 6, line 60.

Regarding claim 20, Osakabe meets the claimed limitations as follows: "The method for transferring data as defined in Claim 11, wherein the following steps are executed before said receiving device makes a request for said decrypting information:

i) said receiving device sending information required by said sending device at least for establishing a common key with said sending device; and

ii) said sending device sending information required by said receiving device at least for establishing said common key with said receiving device; and said sending device encrypting said decrypting information using said common key and sending said encrypted decrypting information; and said receiving device extracting said decrypting information from said encrypted decrypting information received using said common encryption key." see abstract; column 5, line 17 to column 6, line 60.

***Conclusion***

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

A. Gass et al (5,208,807) discloses a data transmission method combining asynchronous cells with isochronous channels.

B. Smyers (5,948,136) discloses a mechanism for preventing unauthorized devices from accessing copy-protected data packets.

C. Newman et al (6,157,972) discloses method for processing packetized information over a serial bus (IEEE 1394).

D. Nakano (6,438,693) discloses a system for control the transfer of data over a serial bus (such as an IEEE 1394 bus).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Matthew B Smithers whose telephone number is (703) 308-9293. The examiner can normally be reached on Monday-Friday (9:00-5:30) EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Gregory A Morse can be reached on (703) 308-4789. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Matthew B Smithers
Primary Examiner
Art Unit 2137